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CLAIMS

2     The invention claimed is:

- 3     1.     Joints for constructing a shear wall, comprising:  
4             a bracket;  
5             wherein said bracket is integrally formed with said shear wall;  
6             wherein said bracket is for attaching said shear wall to a  
7             substrate; and  
8             wherein said bracket is for preventing uplift of said shear wall.
- 9     2.     The joints as defined in claim 1, wherein said bracket consists of:  
10            a)     a base; and  
11            b)     a pair of side walls;  
12            wherein said base of said bracket is for abutting against the  
13            substrate;  
14            wherein said base of said bracket has a pair of longitudinal edges;  
15            and  
16            wherein said pair of side walls of said bracket extend upwardly from  
17            said pair of longitudinal edges of said base of said bracket,  
18            respectively, so as to allow said bracket to have a generally and  
19            substantially U-shape in lateral cross section.
- 20    3.     The joints as defined in claim 2, wherein said base of said bracket  
21            has a pair of through bores; and  
22            wherein said base of said bracket is for affixing to the substrate.
- 23    4.     The joints as defined in claim 2, wherein each side wall of said  
24            bracket has a plurality of through bores.
- 25    5.     The joints as defined in claim 4; further comprising a track wall;  
26            wherein said track wall functions as a sole plate;

1            wherein said track wall functions as a top plate;  
2            wherein said track wall consists of:  
3            a)    a base; and  
4            b)    a pair of side walls;  
5            wherein said base of said track wall has a pair of longitudinal  
6            edges;  
7            wherein said base of said track wall has a pair of through bores;  
8            wherein said pair of through bores in said track wall align with  
9            said pair of through bores in said base of said bracket; and  
10           wherein said pair of side walls of said track wall extend upwardly  
11           from said pair of longitudinal edges of said base of said track  
12           wall, respectively, so as to allow said track wall to have a  
13           generally and substantially U-shape in lateral cross section.

14        6.    The joints as defined in claim 5, wherein said track wall sits in  
15           said bracket so as to allow said bracket to capture said track wall.

16        7.    The joints as defined in claim 5, wherein said base of said track  
17           wall abuts against said base of said bracket.

18        8.    The joints as defined in claim 5, wherein said side walls of said  
19           track wall abut against said side walls of said bracket,  
20           respectively.

21        9.    The joints as defined in claim 5; further comprising a base plate;  
22           wherein said base plate sits in said bracket.

23        10.   The joints as defined in claim 9, wherein said base plate abuts  
24           against said base of said track wall.

25        11.   The joints as defined in claim 9, wherein said base plate has a pair  
26           of through bores;

- 1 wherein said pair of through bores in said base plate align with  
2 said pair of through bores in said base of said track wall,  
3 respectively; and  
4 wherein said pair of through bores in said base plate align with  
5 said pair of through bores in said base of said bracket,  
6 respectively.
- 7 12. The joints as defined in claim 11; further comprising a stud;  
8 wherein said stud extends from said bracket.
- 9 13. The joints as defined in claim 12, wherein said stud has an end;  
10 wherein said end of said stud abuts against said pair of side walls  
11 of said bracket;  
12 wherein said end of said stud is affixed to said pair of side walls  
13 of said bracket;  
14 wherein said end of said stud abuts against said base of said track  
15 wall when said base plate is not present so as to allow said base  
16 of said track wall to distribute the load of said stud to said  
17 bracket; and  
18 wherein said end of said stud abuts against said base plate when  
19 said base plate is present so as to allow said base plate to  
20 distribute the load of said stud to said track wall and ultimately  
21 to said bracket.
- 22 14. The joints as defined in claim 2; further comprising at least two  
23 diagonal braces;  
24 wherein said at least two diagonal braces extend diagonally  
25 outwardly from said bracket.
- 26 15. The joints as defined in claim 14, wherein each of said at least two  
27 diagonal braces abuts against a respective side wall of said  
28 bracket; and

1            wherein each of said at least two diagonal braces is affixed to said  
2            respective side wall of said bracket.

3       16.    The joints as defined in claim 14, wherein each of said at least two  
4            diagonal braces is flat.

5       17.    The joints as defined in claim 14, wherein each of said at least two  
6            diagonal brace has an end; and  
7            wherein said end of each of said at least two diagonal braces has  
8            a plurality of through bores.

9       18.    The joints as defined in claim 17, wherein said plurality of through  
10           bores in said end of each of said at least two diagonal braces align  
11           with corresponding through bores in said respective side wall of  
12           said bracket.

13      19.    The joints as defined in claim 5, wherein one joint is an  
14           intermediate base joint;  
15           wherein the substrate is a concrete foundation;  
16           wherein said track wall extends outwardly from both ends of said  
17           base of said bracket;  
18           wherein said pair of through bores in said base of said bracket,  
19           said pair of through bores in said track wall, and said pair of  
20           through bores in said base plate receive a pair of anchor bolts  
21           extending upwardly out of the concrete foundation that ultimately  
22           receive a pair of nuts, respectively;  
23           wherein said stud extends centrally upwardly from said base plate  
24           so as to be straddled by said pair of nuts; and  
25           wherein said at least two diagonal braces are four, a pair of each  
26           extending from each side wall of said bracket, diagonally outwardly  
27           in opposite directions.

- 1     20.   The joints as defined in claim 5, wherein one joint is an end base  
2           joint;  
3           wherein the substrate is a concrete foundation;  
4           wherein said track wall extends outwardly from an outermost end of  
5           said base of said bracket;  
6           wherein only an outermost one of said pair of through bores in said  
7           base of said bracket, an aligned one of said pair of through bores  
8           in said track wall, and an aligned one of said pair of through bores  
9           in said base plate receive an anchor bolt extending upwardly out of  
10          the concrete foundation that ultimately receives a nut;  
11          wherein said stud extends upwardly from an outermost end of said  
12          base plate; and  
13          wherein said at least two diagonal braces extend diagonally  
14          inwardly.
- 15     21.   The joints as defined in claim 5, wherein one joint is a ceiling and  
16           floor joint;  
17           wherein the substrate is an upper header and a lower header that are  
18           spaced-apart by floor joists and a stud;  
19           wherein two brackets are utilized;  
20           wherein said base of one bracket is for abutting against said upper  
21           header;  
22           wherein said base of the other bracket is for abutting against the  
23           lower header;  
24           wherein said other bracket is in alignment with said one bracket;  
25           wherein two track walls are utilized;  
26           wherein one track wall extends outwardly from both ends of said base  
27           of said one bracket;  
28           wherein the other track wall extends outwardly from both ends of  
29           said base of said other bracket;  
30           wherein said through bores in said base of said one track wall, said  
31           pair of through bores in said base of said one bracket, a pair of

1 through bores in the upper header, a pair of through bores in the  
2 lower header, said pair of through bores in said base of said other  
3 bracket, and said pair of through bores in said base of said other  
4 track wall receive a pair of through bolts;  
5 wherein two studs are utilized;  
6 wherein one stud extends centrally upwardly from said base of said  
7 one track wall so as to be straddled by said pair of through bolts;  
8 wherein said one stud is aligned with the stud of the substrate;  
9 wherein the other stud depends centrally from said base of said  
10 other track wall so as to be straddled by said pair of through  
11 bolts;  
12 wherein the other stud is aligned with the stud of the substrate;  
13 and  
14 wherein said at least two diagonal braces are eight, a pair of each  
15 extend from each side wall of each bracket, diagonally outwardly in  
16 opposite directions.